

AMENDED CLAIMS

1. Microbicidal peptides having a specific arrangement and disulfide-linkage of four cystein residues.

2. Microbicidal peptides according to claim 1 characterized in that the peptides have a three-dimensional structure as shown in figure 13.

3. Microbicidal peptides according to claim 1 characterized in that the peptides are CXC chemokines.

4. Microbicidal peptides according to claim 1 characterized in that the peptides are thrombocidin-1 (TC-1), or variants thereof which comprise at least in part the sequence as shown in figure 1, indicated by the label TC-1, and have microbicidal activity.

5. Microbicidal peptides according to claim 1 characterized in that the peptides are thrombocidin-2 (TC-2), or variants thereof which comprise at least in part the sequence as shown in figure 1, indicated by the label TC-2, and have microbicidal activity.

6. Peptides, or variants thereof, according to claims 1-5 characterized in that said peptides, or variants thereof, are prepared recombinantly.

7. Peptides, or variants thereof, according to claims 1-6 characterized in that said peptides, or variants thereof, exhibit bactericidal activity against gram-positive and gram-negative bacteria, for example Escherichia coli, Bacillus subtilis, Streptococcus sanguis, Streptococcus pneumoniae, Staphylococcus epidermidis, and Staphylococcus aureus.

8. Peptides, or variants thereof, according to claims 1-6 characterized in that said peptides or variants thereof exhibit fungicidal activity against fungi, for example Candida albicans, C. glabarata, Cryptococcus neoformans, Aspergillus flavus, A. fumigatus, and Pseudoallescheria spec..

9. Peptides, or variants thereof, according to any of claims 1-8 characterized in that the variants of

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depth

the peptides are at least 70% homologous, preferably at least 80%, more preferably at least 90%, most preferably at least 95%, to said peptides and have microbicidal activity.

5 10. Peptides, or variants thereof, according to any of the preceding claims containing an additional N-terminal Histag sequence and having an enhanced microbicidal activity in comparison to the same peptides without N-terminal Histag.

10 11. Peptides, or variants thereof, according to any of the preceding claims for use in the treatment of bacterial infections in human and animals.

12. Peptides, or variants thereof, according to claim 11 **characterized in that the bacterial infection is**
15 **endocarditis.**

13. Use of peptides, or variants thereof, according to any of the preceding claims for the preparation of a medicament for the treatment of bacterial infections in human and animals.

20 14. Use of peptides, or variants thereof, according to any of the claims 1-12 in release systems for prevention of bacterial infections in human and animals.

25 15. Use of peptides, or variants thereof, according to claim 13 or 14 **characterized in that the bacterial infections is endocarditis.**

16. Peptides, or variants thereof, according to any of the claims 1-12 for use in the treatment of fungal infections in human and animals.

30 17. Peptides, or variants thereof, according to claim 16 **characterized in that the fungal infection is endocarditis.**

18. Use of peptides, or variants thereof, according to any of the preceding claims for the preparation of a medicament for the treatment of fungal infections in human and animals.

35 19. Use of peptides, or variants thereof, according to any of the preceding claims in release

systems for prevention of fungal infection in human and animals.

20. Use of peptides, or variants thereof,
according to claim 18 or 19 characterized in that the
5 fungal infection is endocarditis.

21. Use of a Histag sequence for the
preparation of microbicidal peptides having an enhanced
microbicidal activity in comparison to the same peptides
without additional Histag sequence.

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Add B1
Add C2